Experience in addressing climate change by technology transfer under **South-South Cooperation framework**

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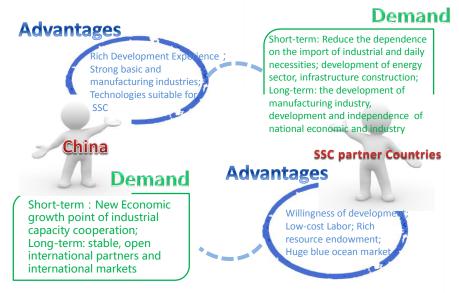
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Latest Policies of the Chinese government in the field of South-South Cooperation(SSC) and climate change

- 2013-2014: Proposed the construction of "Silk Road Economic Zone" and "21st Century Maritime Silk Road"
- 2015: The UN Development Summit: 5 measures to implement the 2015 development agenda
- April 2016:Put forward to build "green technology Bank", uphold specialized thinking
- September 5, 2017: BRIC leaders met in emerging market countries and developing National Dialogue in Xiamen, and issued "BRIC National Leaders Xiamen Declaration" to create "BRIC" cooperation mode.



Technology transfer through SSC



Technology transfer through SSC

Common Demand

- Material assistance solves temporary difficulties whereas joint development goes for long-time aspiration.
- SSC has become an important means to cope with global development issues.

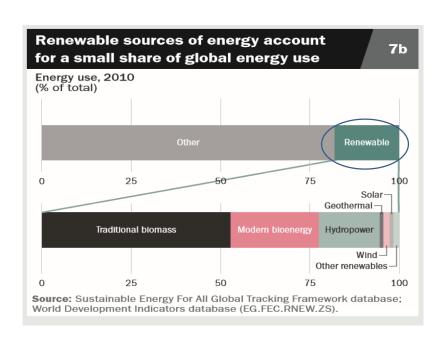
Valuable Opportunity

- In the new stage of rapid development of world economic and technology, SSC provides the possibility for the industry capacity cooperation between China and other developing countries.
- Emerging economies have elements of economic development, such as capital, technology, markets and management



Practice of technology transfer under South-South Cooperation

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China-Ghana/Zambia Renewable Energy Technology Transfer (RETT) South- South Cooperation Project

- Led by UNDP China, it is a trilateral cooperation project, implemented by the governments of China, Ghana and Zambia with the financial support from Denmark.
- Goals: With the transfer of renewable energy technology from China to Ghana and Zambia
 - For Ghana and Zambia
 - To improve the electrification and power supply of Ghana and Zambia
 - To enhance the using capacity of applying RET
 - To promote local market environment, building a solid basis for large-scale adoption of RET
 - For China
 - To invigorate the capacity of South-South Cooperation
 - To accelerate the development of renewable energy technology in China

Achievements of China-Ghana/Zambia RETT South- South Cooperation Project

- · Policy research
 - Renewable Energy Master Plan (REMP) of Ghana
 - Financial Researches on Renewable Energy Technology Transfer etc.
- Technology transfer
 - Support to finish the feasibility study report of mini-hydro station in Zambia
 - Help to build cooperation relationship with Chinese technology suppliers for Ghana/Zambia
- Knowledge sharing
 - Study tours, trainings, seminars and match-making between experts and policy makers from China, Ghana and Zambia
 - Workshops on Demo Projects, Standards Researches and REMP
 - Match-Making workshop of Ghana, Zambia and China
- Building platform
 - Bilingual website for the information sharing

Achievements of China-Ghana/Zambia RETT **South-South Cooperation Project**

We are working on China-Ghana/ China - Zambia South - South Cooperation Renewable Energy Technology Transfer Droject, facilitating exchanges of expertise and tachnology between China and African Gustins, in order to reach "SE4ALL". I hope this renewable energy project goes very well and benefits people and communities





Challenges and countermeasures of SSC on Renewable **Energy**

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Challenges of SSC on RETT

	Challenges	Categories
1	Bottleneck of the Political Regulations and Policy Framework	
2	High Enthusiasm whereas Insufficient Information Communication	Construction of
3	Greatest Concern - Stability of Partner Countries' Environment	soft environment
4	Lack of Local Technical Staff – Equipment Could not be Used Properly after Transferred	
5	Cost Effectiveness - the Biggest Problem after the Handover of Results	
6	Partner's projects are too small to effectively attract Chinese Partners	Sustainable mode
7	Compared with Aid and Trade, Partner Countries Prefer Foreign Investment	development
8	SSC - Opportunities for Both Sides Companies and Investment Institutions	

Construction of soft environment

Challenges		Countermeasures
1	Bottleneck of the Political Regulations and Policy Framework	A demonstration project will be set up under RETT project, and the government will give preferential policies to the demonstration project after consultation of both sides of the cooperation project.
2	Insufficient Information Communication	Build on-line information platform –RETT Center website, through the web to demonstrate both demand and supply through the Web, Reduce information costs for technology transfer

Construction of soft environment

	Challenges	Countermeasures
3	Greatest Concern - Stability of Partner Countries' Environment	Knowledge sharing trainings and meetings are regularly held under RETT project, inviting government officials and experts from both sides, to explain policy, market and cultural face to face, and sharing the key contents on the internet.
4	Lack of Local Technical Staff – Equipment Could not be Used Properly after Transferred	During demo project building period, Chinese experts will teach and show local technical staff hand by hand, from design, construction, cost calculation to equipment installation and maintenance



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Sustainable mode development

	Challenges	Countermeasures
1	Cost Effectiveness - the Biggest Problem after the Handover of Results	Considering the business model and cost-benefit from the beginning of the project design (1)Combine RE and other industries, such as biogas and agricultural products processing, photovoltaic and agri. irrigation; (2)investigate the consumption preferences of local residents. Eg. in Zambia, the residents need PV fans because of the unstable power supply.
2	Partner's projects are too small to effectively attract Chinese Partners	Selecting <i>demonstration project + commercial projects</i> mode, partner countries prepare a list of hydropower projects, in which small projects as demonstration projects. These demo projects could receive financial, technical and policy supports, and large projects as commercial projects will follow the successful operation of demo projects, replicate the model and give priority to the demo project contractors.

Sustainable mode development

Challenge	s Countermeasures
Compared with A and Trade, Partne Countries Prefer Foreign Investment	that appropriate to aid, investment, product trading, and knowledge sharing etc. Design different project
Enterprises and investment institutions in China look for more opportunities under SSC	 Leveraging social capital with aid funds Set up pilot project plan; Use project assistance funds to support the pre-and feasibility study of pilot projects; Based on the research results, screening the feasible projects, attracting social financial support.

Challenges and countermeasures of SSC on Renewable **Energy**



1. Build up international cooperation platform



By implementing pragmatic cooperation on South-South Cooperation

- maximize and complement the individually technological advantages
- enhance experience in international exchanges and cooperation, as well as other related soft power



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2. Objective: Economical win-win situation

- Demand-driven
- Cooperation mode diversity
- Mechanism (institutions, usage of capital)







Find reliable partners



Plan for the whole procedure

Emphasize on business mode



3. Pay more attention to and strengthen the construction of public resources (eg. soft environment)







Construct information communicating channels technique



Formulate standard



Enforce capacity building



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Thank you for your time!